

5

ABSTRACT

A laterally expandable spinal implant includes a central body and two wings that are adapted to be received within an inner chamber formed within the central body. The wings have guide rails that fit into grooves defined in the central body. To ensure that the implant is properly secured, each guide rail has an outer end with a cutting surface that cuts into vertebral end plates when the wings are extended. The two wings are connected together through a central turnbuckle shaft that has geared teeth and threading on both ends that engage threaded cavities in the wings. Through the gear teeth, the turnbuckle shaft is able to be rotated so as to laterally extend the wings from the central member. A locking mechanism locks the turnbuckle shaft to prevent the wings from retracting.

15